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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/585,933	06/02/2000	Brig Barnum Elliott	00-4013	6270

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EXAMINER	
SONG, HOSUK	

ART UNIT	PAPER NUMBER
2135	

DATE MAILED: 04/02/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/585,933	ELLIOTT, BRIG BARNUM	
	Examiner	Art Unit	
	Hosuk Song	2135	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *02 June 2000*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-20* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,2,4-12 and 14-17* is/are rejected.

7)☒ Claim(s) *3,13,18* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date *4*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

1. Claims 1-2,4-12,14-17,19-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tatebayashi(US 6,359,986) in view of Fox et al.(US 6,560,581).

Claim 1: Tatebayashi discloses generating a first collection and a second collection of encryption bits in a key supply device in (fig.2,#113 and col.8,lines 16-31). Tatabayashi discloses storing first collection of encryption bits in a memory of storage module and transporting key storage module to a data production device in (fig.1,#21 and col.9,lines 9-11). Tatebayashi discloses connecting key storage module to the production device and supplying first collection of encryption bits from module to production device in (col.8,lines 65-67;col.9,lines 1-11 and fig.10,#21,205,40,200). Tatebayashi discloses encrypting data produces by data production device using first collection of encryption bits in (col.9,lines 36-40). Tatebayashi does not specifically discloses deleting first collection of encryption bits from memory of key storage module. Fox's patent discloses key set generator where once key is generated it is discarded from the memory after its use in (col.17,lines 62-67;col.18,lines 9-12). It would have been obvious to person of ordinary skill in the art at the time invention was made to employ a key set generator where once key is generated it is discarded from the memory after its use as taught in Fox with a key set generator disclosed in Tatebayashi so that key bits

no longer needed can be safely destroyed in memory without danger of unidentified copies of the key remaining in computer memory.

Claim 2: Tatebayashi discloses transporting key storage module to key supply device and connecting key storage module to key supply device in (fig.10,#21,205,203-204). Tatebayashi discloses supplying second collection of encryption bits from key supply device to key storage module in (col.9,lines 9-11col.7,lines 65-67;col.8,lines 1-15). Tatebayashi discloses storing second collection of encryption bits in the memory of the key storage module in (fig.10).

Claims 4,5: neither Tatebayashi nor Fox specifically discloses supplying power from data production device to key storage module after key storage module is connected with data production device. It is inherent in system of Tatebayashi and Fox's system to include supply power once it is connected to the device in order to carry out specific calculation.

Claim 6: Tatebayashi discloses storing data in a memory of production device in (fig.1).

Claim 7: Tatebayashi discloses data production device comprises a communication device in (fig.10).

Claim 8: Tatebayashi discloses transmitting encrypted data from communicating device to another communication device in (fig.1).

Claims 9-12: Tatebayashi does not specifically disclose retrieving,determining and signaling whether stored encryption bits below a predetermined amount. Examiner takes Official notice that this is well known in the art. One of ordinary skill in the art would have been motivated to use the scheme in order to set desired level of encryption security of the data so that user can select desired level of security for each data.

Claims 14-17,19-20: Tatebayashi discloses a key storage module configured to store encryption bits in a memory of key storage module and communication device configured to retrieve a quantity of encryption bits from memory of key storage module in (fig.1 and col.9,lines

2-11). Tatebayashi discloses encrypted data is transmitted from communication device using quantity of encryption bits in (fig.1 and col.8,lines 38-44). Tatebayashi does not specifically discloses retrieval depletion process of encryption bits stored in the key storage module. Fox's patent discloses this process in (col.17,lines 62-67;col.18,lines 9-12). It would have been obvious to person of ordinary skill in the art at the time invention was made to employ a depletion process as taught in Fox with a key set generator disclosed in Tatebayashi so that key bits no longer needed can be safely destroyed in memory without danger of unidentified copies of the key remaining in computer memory. Further, depletion process allows for efficient memory management.

Allowable Subject Matter

2. Claims 3,13,18 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hosuk Song whose telephone number is 703-305-0042. The examiner can normally be reached on Tue-Fri from 6:00 am to 4:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kim Vu can be reached on 703-305-4393. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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